laser annealing the amorphous semiconductor material to form a single crystalline semiconductor layer containing germanium; and

doping the single crystalline semiconductor layer and the substrate at a source location and a drain location to form a source region and a drain region, whereby a channel region between the source region and the drain region includes a thin semiconductor germanium region.

8. (Amended) The method of claim 1, wherein the amorphous semiconductor material includes silicon germanium.

9. (Amended) The method of claim 7, wherein the amorphous semiconductor material includes silicon germanium.

11. (Amended) The method of claim 1, further comprising

providing a second amorphous semiconductor material above the amorphous semiconductor material including germanium before the laser annealing step, wherein the laser annealing step forms a second single crystalline semiconductive layer from the second amorphous semiconductor material; and

siliciding the source region and the drain region to form a silicided layer wherein the depth of the silicided layer is deeper than the second single crystalline semiconductor layer.